

# Using atlas data as a spatial reference for a result of a realistic neural network simulation

## Model download

From

<http://www.3dbar.org:8080/getPreview?cafDatasetName=aba2011;structureName=grey,VPL,SSp-bfd1,SSp-bfd2Slash3,SSp-bfd3,SSp-bfd4,SSp-bfd5,SSp-bfd6a,SSp-bfd6b>  
The Allen Mouse Brain Reference Atlas, 2011 Segmentation download the following VRLM high quality models:

- <http://www.3dbar.org:8080/getReconstruction?cafDatasetName=aba2011&structureName=grey&qualityPreset=high>  
Basic cell groups and regions,
- <http://www.3dbar.org:8080/getReconstruction?cafDatasetName=aba2011&structureName=VPL&qualityPreset=high>  
Ventral posterolateral nucleus of the thalamus,
- <http://www.3dbar.org:8080/getReconstruction?cafDatasetName=aba2011&structureName=SSp-bfd1&qualityPreset=high>  
Primary somatosensory area, barrel field, layer 1,
- <http://www.3dbar.org:8080/getReconstruction?cafDatasetName=aba2011&structureName=SSp-bfd2Slash3&qualityPreset=high>  
Primary somatosensory area, barrel field, layer 2/3,
- <http://www.3dbar.org:8080/getReconstruction?cafDatasetName=aba2011&structureName=SSp-bfd4&qualityPreset=high>  
Primary somatosensory area, barrel field, layer 4,
- <http://www.3dbar.org:8080/getReconstruction?cafDatasetName=aba2011&structureName=SSp-bfd5&qualityPreset=high>  
Primary somatosensory area, barrel field, layer 5,
- <http://www.3dbar.org:8080/getReconstruction?cafDatasetName=aba2011&structureName=SSp-bfd6a&qualityPreset=high>  
Primary somatosensory area, barrel field, layer 6a,
- <http://www.3dbar.org:8080/getReconstruction?cafDatasetName=aba2011&structureName=SSp-bfd6b&qualityPreset=high>  
Primary somatosensory area, barrel field, layer 6b.

Download also a model of a of the barrel cortex collumn. Unwrap downloaded archives.

## Model loading

Run <http://www.paraview.org> ParaView software. Open downloaded \*.wrl and \*.vtk files. Click *Apply*.